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Friends of the Chair on integrated economic statistics

Note by the Secretary-General

In accordance with a request of the Statistical Commission at its thirty-seventh session,** the Secretary-General has the honour to transmit to the Statistical Commission the report of the Friends of the Chair on integrated economic statistics. The report presents a concept paper on the modalities of the integrated approach to economic statistics and includes recommendations by the Friends of the Chair arising from the concept paper. The Commission may wish to comment on the concept paper and the recommendations.

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Report of the Friends of the Chair on integrated economic statistics

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I. Introduction

1. The idea of developing and achieving an integrated international statistical programme or an integrated system of international statistics has quite a long history in United Nations Economic and Social Council discussions, leading to such Council resolutions as 1306 (XLIV) and 1566 (L). The most recent development was the submission by the Secretary-General to the Statistical Commission at its thirty-seventh session, held from 7 to 10 March 2006, of a report presenting a proposal for the establishment of an integrated programme on economic statistics and a light coordination mechanism among the various groups dealing with such statistics (E/CN.3/2006/5). The report was based on the recommendations of expert groups meetings, organized by the Statistics Division, in the fields of distributive trade, industrial statistics and economic census.

2. At its thirty-seventh session, the Statistical Commission endorsed the concept of an integrated approach to economic statistics and recommended its operationalization with respect to national economic statistics programmes. The Commission also recommended the establishment of a Friends of the Chair Group, to prepare a concept paper on the modalities of the integrated approach to economic statistics, including the feasibility of establishing a mechanism to improve coordination among international organizations and work groups engaged in economic statistics (see E/CN.3/2006/32). At its thirty-eighth session, the Commission took note of a progress report summarizing the initial activities of the Group (E/CN.3/2007/8). Its composition is contained in the annex.

3. When the Friends of the Chair Group started its work, late in 2006, it soon appeared that there were diverging views on several fundamental issues, such as the concept of "economic statistics", the scope of the integrated approach to economic statistics and the role of international macroeconomic statistical standards in that context (*System of National Accounts 1993* (1993 SNA), *Balance of Payments Manual*, fifth edition (BPM5), *Government Finance Statistics Manual 2001* (GFSM 2001), and *Monetary and Financial Statistics Manual 2000* (MFSM 2000)). An issues paper drafted by the Moderator and endorsed by the Group in March 2007 helped to delineate better the concept of integrated economic statistics and paved the way for its operationalization. A high-level work session, held in June 2007 in Berne, co-organized by the Moderator and the Statistics Division, further elaborated on those intermediate results.[1]

4. The conclusions of the work session and written contributions from several participating countries and organizations were the main inputs for the concept paper drafted by the Moderator contained in the present report. The concept paper went through two rounds of consultation in the Group and was amended by the Moderator to take into account the comments made to every possible extent.

5. For the purposes of the present report, integrated economic statistics are defined as "statistics within one conceptual framework and free of statistical discrepancies". Operationalizing that definition involves essentially harmonizing selected aspects of economic statistical standards, (re)designing statistical

[1] The documents, presentations and summary conclusions of the work session are available at: http://www.bfs.admin.ch/bfs/portal/en/index/institutionen/int_coop/un/integratedecostat.html.

production processes and implementing supportive institutional arrangements.[2] The present concept paper is structured around those aspects. It attempts to identify building blocks and a few guiding principles for integrating economic statistics while allowing for different stages in the integration process and taking into account specific circumstances of different countries.

II. Need for integrated economic statistics

6. There are many good reasons to treat the different domains of economic statistics not only as statistics in their own right, but rather as interrelated statistics so that they form a consistent and coherent statistical information system. The main reason is that users need such an integrated approach. At any point in time, users expect the statistical information on a particular segment of the economy to relate to a broader context, namely the overall economy. Consistency in the statistical information delivered throughout the business cycle, albeit increasingly detailed, is also important to them. Any shortcomings in providing the consistent and coherent information users require may lead to misinterpretations and policy mistakes that could be costly for the economy in terms of output, employment and price stability, as well as financial and monetary objectives.

7. Integrated economic statistics entail several benefits for data users, data providers and statistical agencies, summarized below:

(a) They meet the demands of users better, mainly as regards data consistency,[3] and therefore increase the value of statistical information;

(b) They make it easier for statistical agencies to monitor and improve data quality and facilitate conducting data revisions through the application of integration frameworks;

(c) They facilitate aggregation and comparison among disparate data sets facilitating, for example, the compilation of coherent macroeconomic statistics such as national accounts and balance of payments statistics;

(d) They facilitate analyses based on microdata coming from different but coherent sources, a must to address key policy issues such as innovation and the impact of globalization;

(e) They make it easier for statistical agencies to streamline statistical production processes and, therefore, make them more efficient;

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[2] The Euro area sector accounts provide a case study of an integrated model. They are based on, but are not the simple sum of, the national accounts of the concerned European Union Member States, and the data conform to accounting conventions, international standards and integration techniques. The European System of Central Banks (ESCB) provides the necessary institutional governance. The ESCB governance structure includes (a) the protection of confidentiality of statistics, (b) a cost-effective approach to new statistics and (c) a medium-term planning strategy. It should also be mentioned that large parts of economic statistics have a legal basis in the European Union, which has a positive impact on the successful harmonization of concepts, and on the compliance with international standards, guidelines and best practices.

[3] It may be argued that integrated economic statistics also meet the demands of users as regards relevance, accuracy, reliability, timeliness, coverage, detail and accessibility of data.

(f) They may reduce the burden on respondents, provided the level of detail is kept constant;

(g) They draw attention to internal constraints on human resources and finances as well as external relations in linking the collections of official statistics to legal mandates and related user interactions through advisory committees.

8. It is necessary to make clear that integrated economic statistics come at a cost. Resources have to be invested in harmonizing statistical standards, in re-engineering statistical production processes and in changing institutional arrangements. It is therefore important to go through a cost-benefit analysis to assess in each case up to which point economic statistics integration makes sense, taking into account all interested parties (data users, data providers and statistical agencies). The objective should be a phased and realistic or optimum integration, not a theoretical or maximum integration, taking into account countries' circumstances.

III. Integration of economic statistics

9. Integrating economic statistics is about statistical reconciliation, that is, ensuring that the messages statistics deliver are consistent and coherent. It must be so because the underlying reality economic statistics describe, the economy, is one and the same. Statistical reconciliation in economic statistics is a task that is traditionally performed by applying national accounts and other macroaccounting and classification frameworks.

10. We should aim for a three-dimensional integration of economic statistics: horizontal, vertical and temporal. Horizontal integration is about reconciling the various primary statistics on production, trade, labour and consumption, before they enter macroeconomic accounts (national accounts and balance of payments). Vertical integration is about reconciling primary statistics and macroeconomic accounts as well as national and international economic statistics. Finally, temporal is about reconciling short-term and structural economic statistics produced at different points in time but referring to the same phase in the business cycle.

11. The integrated approach to economic statistics involves dealing with conceptual issues, statistical production issues and institutional issues.

A. Conceptual issues

12. The integration of economic statistics requires the use of a common conceptual framework. That framework exists and is formed by the 1993 SNA. The role of the 1993 SNA as a coordinating framework for economic statistics to ensure not only numerical consistency but also conceptual consistency is well established and was acknowledged by the Economic and Social Council in its resolution 1993/5.

13. The 1993 SNA is based on a set of internationally agreed concepts, definitions, classifications and accounting rules. International macroeconomic statistical standards in specific sectors, such as BPM5, GFSM 2001 and MFSM 2000 are

harmonized with the 1993 SNA.[4] That means that they share a number of common features with the 1993 SNA as regards institutional units and sectors, residence, stocks (assets and liabilities)/economic flows and their integration, accounting and valuation rules.[4] The extension of those features to all economic statistics would be a major step towards integration. It would also be possible for economic statistics to keep their own specific features, provided there were workable links with those of the 1993 SNA.

14. Acknowledging the 1993 SNA as the common conceptual framework for economic statistics does not mean that microdatabases should be made fully compatible with macroeconomic accounts. That is impossible for various reasons. Rather, as the 1993 SNA puts it, "as a general objective, the concepts, definitions and classifications used in economic accounting should, so far as possible, be the same at both a micro and macro level to facilitate the interface between the two kinds of data".[5]

15. In that context it should be mentioned that international recommendations have been adopted on primary economic statistics such as industrial statistics, distributive trade statistics, construction statistics and tourism statistics to collect and publish economic statistics at a detailed level to supplement macroeconomic standards. Both the update of the 1993 SNA and the revisions of various international recommendations on primary economic statistics (industrial statistics, distributive trade statistics, tourism statistics and tourism satellite accounts) are being submitted for adoption by the Commission in 2008. To the extent possible, the revised international recommendations increasingly warrant the compatibility of microdatabases with macroeconomic accounts.

B. Statistical production issues

16. A major cause of incoherence among economic statistics is that surveys and statistics for different industries or activities are designed independently of each other. The traditional approach to the collection of economic statistics has been to cover different topics and industries in a rolling programme of surveys and censuses spread over several years. The resulting inconsistencies in survey and questionnaire designs can make the integration of economic statistics difficult.

17. The integration of economic statistics creates pressure for all economic data collections to change the objectives of statistical design and development. The objective of accurately measuring the industry or sector remains, but an equally important objective is designing statistics that are consistent with those for other industries and sectors. When designing a collection for manufacturing industries, methodologists will need to think beyond their current work to how it will integrate with other statistical outputs. For example, questionnaires cannot be designed in

[4] The European System of Accounts 1995 (ESA 95, the statistical standard used for national accounts in the European Union) is also fully consistent with SNA 93. It should be noted that differences, largely in terms of reporting frameworks and details, do exist however because each of those standards are designed to meet specific policy variables and analytical needs. The differences are well identified and can generally be reconciled if need be, for example through detailed classifications.

[5] SNA 93, para 1.67.

isolation but must use concepts, definitions and classifications that are used in other economic surveys and administrative collections.

18. The application of consistent classifications to appropriately defined statistical units is essential for the coherence of economic statistics. The challenge lies in ensuring that unit models and classifications are applied consistently across all statistical measures. One way to ensure consistency of units and classifications is to use a comprehensive business register as the vehicle for structuring units and assigning their classifications. If all survey populations are drawn from the business register and all administrative data are matched to it, all data records can take the classifications that they have already had assigned to them on the business register. That ensures that information from different data sources is classified consistently and the problem of a unit being classified differently in different surveys is avoided.

C. Institutional issues

19. The integration of economic statistics also depends upon legal, institutional, organizational and statistical conditions, all of which differ widely across countries. For that reason it is neither possible nor desirable to propagate one single and detailed implementation approach towards integrated economic statistics. Some guiding principles can, however, be identified and are elaborated upon in the next section of the present report.

20. It is important to make clear that there is no "right" institutional setting for integrating economic statistics, in the sense that both centralized and decentralized statistical systems can achieve the goal. However, channels and bodies must exist and be used to conduct a structured dialogue among statistics producers and among them and both data providers and users at the national level; and a lead agency entrusted with the integration of economic statistics must be identified in the national statistical system, its function (ideally) established by law or by any other binding instruments and its role acknowledged in day-to-day business by other statistics producers.

21. International institutions (international organizations, their secretariats and their steering and working bodies) are equally important for the integration of economic statistics. They are instrumental in facilitating the development and harmonization of statistical standards across the various domains of economic statistics by ensuring coherent and consistent concepts, definitions, classifications, units and valuation rules. They also check and, when necessary, improve the comparability and consistency of data sets across countries. Here the challenge for Member States is two-sided: on the one hand to build their respective national statistical systems on the results achieved in the framework of international institutions, on the other hand to maintain oversight (and also control) of the work performed in international institutions with a view to ensuring the necessary coordination towards the achievement of statistical integration. It is a demanding task that has been on the agenda of the international community for a long time and that requires constantly renewed efforts.

IV. Production of integrated economic statistics

22. The integration of economic statistics covers all aspects of the statistical production process. The four central elements in that context, which should always be borne in mind, are consistency, coherence, breadth and depth.

23. The first element, consistency, refers to the need to use common concepts, terminology and standards and to defining statistical units uniformly over long periods of time. Consistency within national statistical systems is not a sufficient condition. It must take into account international requirements in order to allow comparability. The second element, coherence, refers to internal linkages and the inter-relatedness of data. It deals, for example, with the ability to establish robust links between enterprise statistics and its constituents (establishments) as well as between economic variables such as exports and production. The third element deals with the breadth of economic statistics programmes, which must tend towards full coverage of the economy. They must be comprehensive and non-duplicative of the business activity of enterprises. The fourth and last element has to do with the depth of economic statistics programmes. That is the part of programmes that deals with issues such as commodity and industry levels of detail.

24. The repercussions of each of those elements for overall statistical systems are numerous and challenging. They require full coverage of the economy, the measurement of economic activities using a very rigorous set of concepts, definitions and standards, and uniformity of detail in order to properly measure economic variables. As well, higher demand for detail puts a lot more pressure on respondents, increasing the importance of using administrative data in building economic statistics programmes.

25. At the different stages of the statistical production process, focusing on five principles may be helpful to integrate economic statistics.

A. Frame, sampling and coverage

26. This principle is about the use of an unduplicated frame system and of a common sample design, the move towards an enterprise-centric approach to ensure full unduplicated coverage of all economic entities and the extensive use of administrative data in the overall system. The enterprise-centric approach means that, while a statistical agency uses a common sample design to measure economic activity at say, the establishment level, the approach also focuses on enterprises to ensure full unduplicated coverage. In most cases, the enterprise and the establishment are the same. When they are not, it is important to establish coherence between enterprises and their constituents.

27. The concept of integrated economic statistics requires commonality of the framework within which the statistics will be produced. A core element of the framework is the development and maintenance of a central frame. That frame represents the backbone of survey activities. It consists of a suite of files, programs and processes that interface with businesses through direct profiling, survey responses and feedbacks as well as indirectly, through administrative sources such as tax records. The frame has to cover all sectors of the economy.

28. A comprehensive business register is the tool permitting the application of consistent classifications to very well defined entities. That is one of the first preconditions of coherence. Coherence cannot be achieved if entities are classified differently by various surveys. Moreover, failing to update the register on a regular basis will require adjusting survey results constantly. The implementation of a comprehensive central register would not be possible in countries with decentralized statistical systems. In that context, the standardization of surveys would also be difficult. However, where countries confront multiple information taken from various business registers and surveys conducted by different administrative and statistical agencies, greater integration and consistency can be achieved through data-sharing and the integration of key forms and industries or through the coordinated review and design of surveys, such as when they are modified.

29. A comprehensive business register has many benefits for the integration of economic statistics. They are summarized below:

(a) The business register provides a consistent reference point for all standard classifications, which facilitates the integration of statistical outputs by ensuring that classifications are applied consistently across all surveys and statistical outputs;

(b) By matching administrative data sets to the business register, problems with duplications and inconsistent coverage of administrative data sets can be reduced to a minimum;

(c) Selecting the samples for all economic surveys from the business register ensures coherence between different surveys and reduces the need for coverage adjustments. It is also very useful in monitoring the response burden;

(d) Administrative and survey data can be combined in a statistical output with the business register ensuring coherence between data sources. For example, the business register can be partitioned with tax data being used for one partition and survey data used for the rest. A unit that is included on two different data sources can be excluded from whichever is appropriate to ensure that coverage is coherent;

(e) When undertaking supply and use balancing, national accountants be confident that information from different sides of the accounts is derived from data sources with consistent population coverage and classifications;

(f) The time series of the demographic information on the business register allows the growth and development of businesses to be analysed. It can be used to ensure that longitudinal microdata analysis is consistent with other economic statistics.

30. With long-term objective of a unified comprehensive statistical register, less advanced statistical systems should take intermediate steps to create a more comprehensive coverage of enterprises through a combination of a limited statistical register (e.g. on the basis of certain types of ownership and legal status) complemented by a non-overlapping area frame. Progressively, the coverage of the statistical register could be extended based on the institutional strengthening of the statistical system to maintain a certain scope. Evidently, there is a limit on the ability of less advanced statistical systems and developing countries with large

informal sectors to include small and microenterprises in their statistical registers, owing to their sheer number.

31. The need to cover all sectors of the economy in statistical programmes is costly and imposes a high response burden. Consequently, relying exclusively on surveys would represent a major barrier to measuring overall economic activity. Even though administrative data do not always align very well with the needs of statistical agencies, they can alleviate substantially costs and response burden issues. To use administrative sources, the central register must contain fields allowing administrative sources to link with entities structures in order to produce the various outputs required by statistical programmes. Linking legal structures and operational structures and being able to derive statistical structures is a basic step towards integration.

32. For operational reasons, a unique identifier should be attributed to each entity on the register. Ideally, that identifier should be determined taking into account the business number used by administrative authorities. That would ensure administrative data are applied correctly to the different entities on the register. Depending on the level of detail available, the unique identifiers should allow administrative data to be mapped to entities on the register at the enterprise level or for its constituents. Unique identifiers are very useful when performing coherence analysis between the enterprise and its constituents. Consistent entity definition across statistical programmes would also help in cross-checking data from various sources. Revenue and employment data are one example.

B. Content and collection

33. This principle emphasizes the needs to use common concepts, terminology and classifications, as well as the value of a comprehensive annual economic survey.

34. Without uniformity comparability is not possible. Major differences in statistics arise from the use of different basic concepts, such as those related to units or transactions. Harmonization is valuable as it reduces those differences and results in a more coherent set of data outputs. Content and collection is the part of the overall strategy where statistical agencies can eliminate duplicate data requests through a strategy centred on enterprises and questionnaires with a common look and feel. The trend towards electronic collection would generate its own kind of standardization, including across agencies (with statisticians working with tax authorities and regulators). Standardization also promotes the development of a special collection strategy as regards important businesses.

35. Finally, the strategy requires a "chart of accounts" or the building of mappings between business accounting data and variables required for the statistical programmes. The chart of accounts is a tool to link business accounting with various accounting frameworks supported by statistical agencies. It greatly facilitates linkages between business accounts, balance sheets and income statements, primary economic statistics and national accounts variables. That helps not only in the design of survey questionnaires, it also provides a good tool for mapping administrative data sources to statistical agencies needs.

36. One way to ensure statistical consistency is to develop an integrated economic collection that covers the entire economy. Once a comprehensive business register is

in place, economy-wide economic collection becomes feasible. A comprehensive annual economic survey interspersed with infra-annual collections has the following benefits:

(a) A collection that covers the entire economy can provide all the information needed for both national accounts and other economic statistics;

(b) Consistent data are collected from across the economy with a core set of variables being collected from all units, whether in annual or infra-annual collections;

(c) Survey questionnaires can be designed to collect both standard accounting variables and the additional information needed to calculate all core national accounts variables;[6]

(d) Survey variables can be aggregated to national accounts variables prior to data editing, allowing analysts to check and explain unusual movements in both national accounts variables and accounting aggregates as a normal part of data checking and consequently, minimizing the need for national accountants to check unit record data;

(e) The combination of a comprehensive business register and an annual economy-wide economic survey can eliminate the need for benchmarking to five yearly economic censuses;

(f) Consistency between annual and infra-annual collections is taken into account in the design of collections.

C. Processing and post-collection

37. This principle emphasizes the importance of using common generic processing systems and methods such as common edit and imputation methodologies. It also promotes the use of a centralized data and metadata repository to enhance analytical activities. Providing output is not sufficient; it must be accompanied with analytical findings and metadata to be provided to those involved in incorporating the data in such frameworks as national accounts.

38. An important goal of the integrated approach is the creation of a suite of centralized processing tools to improve data quality and timeliness, while reducing costs. Data processing represents a very expensive step in survey-taking. If too much emphasis is put on micro-editing and manual intervention, timeliness could be negatively affected and bias could be generated. Processing systems should be integrated as much as possible to reduce maintenance and development costs. There are four centralized tools to be considered by statistical agencies:

(a) A single metadata system for the different surveys;

(b) Centralized collection operations;

[6] For example, the questionnaires collect wages and salaries paid. They also collect the other components of compensation of employees as defined in SNA 93. That means that compensation of employees can be derived by aggregating the appropriate line codes for each unit, rather than adjusting "Wages and salaries" at the aggregate level to take account of the estimated difference. The approach ensures coherence between national accounts and business statistics.

(c) Harmonized methodologies for sampling, editing, imputing and estimating;

(d) A single data repository, which increases data security and makes data more easily accessible to authorized users.

39. The metadata system helps to harmonize all methodology concepts. It facilitates the creation of modular questionnaires sharing common revenue and expense sections. It simplifies post-processing by providing common editing and imputing strategies.

40. In recent years, an ever greater emphasis has been placed on statistical agencies publishing statistics accompanied by adequate metadata. Many statistical agencies have grounded institutional policy in the provision of metadata in their dissemination standards and author guides. The primary responsibilities of statistical agencies regarding metadata, therefore, relate to the following areas:

(a) The compilation of up-to-date metadata to enable users to understand the strengths and limitations of the statistics they describe;

(b) Easy access to metadata by users via a range of different media (website, paper publications, CD-ROMs, etc.);

(c) The active linkage of metadata to the statistical tables and graphs they describe and vice versa;

(d) The use of a common set of methodological items (or metadata elements) in metadata disseminated. If adopted by statistical agencies, the widespread use of the Statistical Data and Metadata Exchange cross-domain concepts would enhance the possibility of more efficient metadata interchange;

(e) The use of a common terminology, notably through the rigorous use of terminology imbedded in the various international statistical guidelines and recommendations.

41. The quality, coverage and usability of administrative data differ widely among sources and across countries. If possible, administrative data should be used during the processing phase to impute missing data or to validate survey results. Some countries will also be able to use administrative data to replace survey data for some parts of the population. Unfortunately, administrative data sources are generally not designed to provide the full range of disaggregated information that statistical surveys deliver. For example, administrative data may not delineate between revenues derived from economic production and other revenues, or essential variables may not be recorded by administrative processes. Consequently, the role of administrative sources in the overall statistical system may be to collect information for smaller enterprises or establishments for which more detailed breakdowns of variables are not material. In most countries, surveys will remain necessary to collect information from complex enterprises (enterprises with multiple establishments operating in different industries or regions).

42. The centralization of operations requires an operational structure that reflects the integrated approach. Decisions to modify any aspect of the content or processing have repercussions on many activities within the statistical system. As a consequence, statistical agencies should pay particular attention to interactions

involving frame operations, sampling, tax data operations, content and collection, as well as processing activities.

D. Outputs

43. This principle deals with the choices statistical agencies must make in dealing with timeliness, accuracy and detail (relevance). Ideally, at this point incoherencies have been identified and eliminated and data, including analytical findings, can be provided centrally.

44. The choice between timeliness and accuracy is a difficult one. While clients need output very rapidly after a reference period, statistical agencies require time to ensure accurate results. Whatever the approach is, as new information becomes available, statistical agencies will be releasing revised statistics. Consequently, in order to help users understand the value of the statistics, a rigorous revision process must be put in place. Revisions should follow standard, well-established and transparent procedures. The process could be monthly, quarterly, annual or for historical time series. The process should be clear about the reasons for revisions, from late response to benchmarking. The proper communication of major statistical revisions is an important element of a revision policy and should include good practices on pre-announcement and documentation.[7] The status of data should be clear (preliminary, final, etc.) Analytical tables quantifying revisions should be provided to users.

45. Analysis reoccurs throughout processing and is essential to ensure quality. Information accumulated during each step of processing should be stored and made available to analysts. Analysts can greatly benefit from access to microdata used to derive macroeconomic variables. Also, analysts can be much more efficient and accurate if they can easily compare data and aggregate statistics across industries or institutional sectors or other aspects of economic interest. To do so, analysts need access to integrated databases. A central warehousing technology allows such an analytical environment and its use should be promoted within statistical agencies. It is a tool, and approach, that requires discipline in terms of implementing standards and classifications, exactly what is required for integrated statistical systems.

E. Feedback from national accounts

46. National accounts are compilation and analytical tools that bring together a great wealth of economic data with the aim of delivering consistent macroeconomic results. Gross Domestic Product (GDP),[8] for example, relies on three compilation methods: production, expenditure and income methods. The three methods use different economic statistics but they aim at delivering one and the same estimate. Therefore, when combining data, national accountants have to use harmonized and unique classifications of producers, users and income receivers, as well as harmonized and unique classifications and definitions of commodities, industries,

[7] See *Guidelines on communication of major statistical revisions in the European Union*, 2007.

[8] GDP combines, in a single figure and with no double-counting, all the output (or production) carried out during a given period by all the firms, non-profit institutions, Government bodies and households that are residents of a given economic territory.

transactions, income categories, assets and accounts. They may also have to make up for missing data and adjust the available data to confirm to macroeconomic accounting identities.

47. Combining the different datasets allows light to be shed on inconsistencies, incompleteness and other shortcomings of economic data, and the causes of those problems to be analysed. National accounts are powerful diagnostic instruments that assess the existing level of integration of economic statistics and allow a strategy to be devised for their further integration. Therefore, it is important to allow national accountants, as integrators of primary economic statistics, to provide proper feedback to the survey statisticians producing the statistics.

V. Institutional arrangements for managing integrated economic statistics

48. The main reasons why institutional arrangements are important in the context of integrated economic statistics are the following:

(a) In every statistical system, statistics are produced outside the national statistical agency by other Government departments and quasi-government organizations. Those statistics must be integrated with the statistics produced by the national statistical agency;

(b) Other organizations provide some of the input data that are used by national statistical agencies. As the use of administrative data increases, national statistical agencies become more dependent on data from sources outside their direct control. Arrangements are important to ensure that administrative data are collected in a way that is consistent with the needs of statisticians;

(c) The integration of economic statistics is more effective if one agency has responsibility for leadership of the national statistical system. Ideally, that role should be established in law or some other binding instrument but, regardless of the legal framework, the lead statistical agency has to demonstrate statistical leadership to ensure that its role is acknowledged in day-to-day business by other statistics producers.

49. The following institutional arrangements are essential for supporting the role of the lead statistical agency: advisory committees, relationship meetings, memorandums of understanding and service level agreements.

A. Advisory committees

50. A strong system of advisory committees is important for the integration of economic statistics. They can support coherence in economic statistics by promoting the use of national and international statistical frameworks and classifications. They can encourage the development, promotion and implementation of standard questionnaires and terminology. Users of statistics represented on advisory committees are generally strong advocates of integrated economic statistics.

51. Advisory committees can also support sound decisions by ensuring that all stakeholders are taken into account in the development of statistics. Users and producers can ensure their needs are addressed by participating in the development

of national statistical standards. For example, if consultation makes the redeveloped classifications more relevant to the producers of statistics they are more likely to be adopted widely.

52. Advisory committees should represent a broad range of economic and statistical interests, including users, producers and suppliers of official statistics. Members should be selected for their knowledge of economic and statistical issues, their interest in the development of economic statistics as a coherent system and their standing in the statistical or economic community.

B. Relationship meetings

53. Regular relationship meetings with Government departments and organizations that use and produce statistics have a number of objectives, including:

(a) Coordination between the producers and users of statistics;

(b) The monitoring of progress on bilateral projects;

(c) Coordination of the planning of joint work between organizations;

(d) Forums for the discussion of new ideas and resolution of problems;

(e) The resolution of data issues relevant to participating organizations.

54. Relationship meetings should work at two levels to support the integration of economic statistics. At the expert level, working groups and practical relationship meetings develop statistical work and resolve practical problems. That must be supported by management-level relationship meetings that build a widespread commitment to integrating the national statistical system and deal with strategic problems. Both types of meetings are essential for the integration of economic statistics.

C. Memorandums of understanding and service level agreements

55. National statistical agencies are making increasing use of administrative data supplied by other organizations. Relationships with supplier organizations are very important, because disruptions in supply can seriously impact the quality of economic statistics. In the short term, the greatest risk is that data might not be delivered on time to meet the timetable for the production of regular statistical outputs. In the longer term, the risks relate to the quality of the data supplied. In that respect, the goal is to ensure consistency between the definitions and classifications used by supplier organizations and those used in economic statistics.

56. An important benefit of memorandums of understanding and service level agreements is that they can consolidate and make cooperation with supplier organizations more predictable. They can, in particular, ensure early warning of changes to administrative procedures that could affect the quality of data used for the production of statistics. More generally, memorandums of understanding and service level agreements can deal with the following issues:

(a) Conditions for the supply of administrative data;

(b) Timetable for the supply of data;

(c) Confidentiality and security of data;

(d) Consultation about new uses of administrative data;

(e) Resolution of disputes;

(f) Consultation before changes are made (variables, administrative forms, etc.).

57. Finally, statistical agencies should make efforts to inform employees of supplier organizations of their role in the overall statistical system. It is important for those staff to understand the role administrative data play in the overall statistical system of their country. Moreover, it should be clear to those staff that the data provided to statistical agencies must be of a high quality.

VI. Conclusion and recommendations

58. The Friends of the Chair Group has reached the following conclusions:

(a) The integration of economic statistics is about statistical reconciliation, that is, ensuring that the messages statistics deliver are consistent and coherent. Reconciliation covers primary economic statistics and macroeconomic accounts, short and long-term economic statistics and national and international economic statistics. In essence, it involves dealing with conceptual, statistical production and institutional issues. Human resources issues (increasing the awareness of statistical agencies' staff concerning the impact of their work on the overall statistical system) and information technology issues (adopting common technology) also play a role and must be considered in that context;

(b) The integration of economic statistics is mainly driven by users' demand for data consistency and coherence;

(c) It is neither possible nor desirable to propagate one single and detailed implementing approach towards integrated economic statistics because national statistical systems are different. There are, however, some general guiding principles (see section IV);

(d) Institutional arrangements at both the national and international levels are important for the management of integrated economic statistics and should be part of the corresponding reform programmes.

59. The Friends of the Chair Group makes the following recommendations:

(a) **The role of the 1993 SNA as a coordinating framework for economic statistics (including at the micro level) must be strengthened and taken into consideration in designing the implementation strategy for the updated SNA by the Intersecretariat Working Group on National Accounts;**

(b) **The Statistical Commission and the Committee for the Coordination of Statistical Activities, with the assistance of the Statistics Division, must strengthen the coordination among international institutions working in the field of economic statistics with a view to furthering the integration of economic statistics;**

(c) **The Statistics Division, in consultation with the Statistical Commission as regards terms of reference and in cooperation with the concerned international and supranational organizations as regards substantive**

work, should take the lead in developing more extensive and practical guidelines that would include case studies on practices of integrated economic statistics, drawing on the material assembled and contributed for the work session of the Friends of the Chair Group and the drafting of the concept paper;

(d) Further work should be pursued by the Statistics Division to guide the selection of areas in statistics where further integration would be useful.

Annex

Countries and organizations participating in the Friends of the Chair Group

Australia, Canada, India, Lithuania, Mexico, Netherlands, New Zealand, Pakistan, South Africa, Switzerland (Moderator), United States of America.

The European Central Bank, Eurostat, the International Monetary Fund, the Organization for Economic Cooperation and Development, Statistics Division.